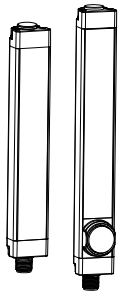
# Features

Banner's HLS28 Hazardous Location LED Strip Light has a sturdy aluminum housing, shatterproof windows, and a low-profile, space-saving design for use in enclosures in hazardous locations.



- Nine single-color models and three multicolor models are available in lengths from 145 mm to 570 mm[1]
- Available with an integrated motion sensor for auto-on when motion is detected
- Single color models can dim lights using the wiring pinout (Hi/Lo/Off)
- Automatic temperature protection built into the unit—above 50 °C, the light dims to manage heat and protect product lifetime
- Certification for installations inside appropriately rated enclosures such as cULus and ATEX/UKCA/IECEx, see "Specifications" on page 4

**NOTE:** When cascading lights, a model with a Motion switch can be used to control the lights cascaded off the switched model.

# Models

| Single Color Models |
|---|
| HLS28XW145XMQ |
| HLS28XW145XM |
| HLS28XW285XM |
| HLS28XW285XMQ |
| HLS28XW285DXMQ |
| HLS28CW285XMQ |
| HLS28XW285XQ |
| HLS28XW430XMQ |
| HLS28XW570XMQ |

| Multicolor Models |
|---|
| HLS28XWGRXX3-285X24Q |
| HLS28XWYRXX3-285X24Q |
| HLS28XWGRYB5-285X24Q |

## Single Color Model Example: HLS28XW285DXMQ

Each part of the model number defines a feature of the light.

**HLS28**
Defines the product family of the light

**X**
Defines the cascadable feature of the light
X = Non-cascadable

**W**
Defines the color of the light
W = Cool white

**285**
Defines the length of the light in millimeters (mm)

**D**
Defines the window
D = Diffused plastic

**X**
Defines the construction of the light
X = Non-sealed

**M**
Defines the control of the light
M = Motion switch

**Q**
Defines the connection of the light
Q = Integral 4-pin M12 quick disconnect

## Multicolor Model Example: HLS28XWGRXX3-285X24Q

Each part of the model number defines a feature of the light.

[1] Contact Banner Engineering for custom configurations or lengths up to 1130 mm.

Original Instructions
19-Aug-25

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221955
p/n: 221955 Rev. B

ПРОМЭЛЕКТРОНИКА/ sales@prom-elec.com

**HLS28**
Defines the product family of the light

**X**
Defines the cascadable feature of the light
X = Non-cascadable

**WGRXX3**
Defines the color combination of the light
WGRXXX3 = White, Green, and Red with override control

**—285**
Defines the length of the light in millimeters (mm)

**[blank]**
Defines the window
Blank = Clear Plastic

**X**
Defines the construction of the light
X = Non-sealed

**24**
Defines the voltage of the light in volts (V)

**Q**
Defines the connection of the light
Q = Integral 4-pin M12 quick disconnect

# Installation Instructions

## Hazardous Location Applications

**WARNING:**
- **Hazardous Locations**
- It is the user's responsibility to ensure that all local, state, and national laws, rules, codes, or regulations relating to the installation and use of this device in any particular application are satisfied. This device must be installed by Qualified Persons, in accordance with this document and applicable regulations.
- A Qualified Person is a person who, by possession of a recognized degree or certificate of professional training, or who, by extensive knowledge, training and experience, has successfully demonstrated the ability to solve problems relating to the subject matter and work.

**WARNING:**
- **Electrostatic Discharge (ESD) Specific Conditions for Safe Use**
- Parts of the enclosure are non-conducting and can generate an ignition-capable level of ESD.
- To reduce the risk of ignition due to electrostatic discharge, avoid contact with the equipment while an explosive atmosphere is present.
- Clean the equipment with only a damp cloth.

**Specific Conditions for Use and General Notes:**
- See Specifications and Wiring Diagrams for important information concerning entity parameters, permissible locations, electrical connections and certifications.
- In addition to the warning above concerning user responsibility, the installation must comply with the following:
  - All installations must comply with all manufacturers' instructions.
    - Must be installed within an enclosure only accessible with a tool, such as a key, and appropriately rated for the application and the environment.
      - NEC/CEC: For Class I Division 2, Groups A, B, C, D classified locations, these luminaires shall be installed within an enclosure that is appropriately rated for the environment per NEC/CEC requirements.
      - ATEX/UKCA/IECEx: The luminaires shall be installed in an enclosure that provides a degree of protection not less than IP54 in accordance with IEC/EN 60079-0. All enclosure materials must be UV blocking.
    - Do not mount these luminaires near heat-generating sources (for example, devices) that will increase the surrounding temperatures within the enclosure greater than the ambient temperature ratings.
    - Division 2 / Zone 2 wiring methods must comply with the following:
      - U.S. Installations: The relevant requirements of the National Electrical Code® (ANSI/NFPA-70 NEC®).
      - Canadian Installations: The relevant requirements of the Canadian Electrical Code (CSA C22.1).
      - ATEX, UKCA, and IECEx Installations: The relevant requirements of EN/IEC 60079-14 and applicable National regulations.
    - The device must be powered by a Class 2 or SELV power supply.
    - Clean with a damp cloth only.

**NOTE:** For quick disconnect models only: use Banner MQDC-4## and MQDEC-4## cordsets (shown in "Accessories" on page 11), or suitable M12 quick disconnect cordsets with threaded retaining nut (see "Specifications" on page 4). The cordset must be securely fastened using the M12 × 1 QD retaining nut to prevent disconnection.


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- Do not attempt any repairs to this device; it contains no field-replaceable parts or components. Tampering and/or replacement with non-factory components may adversely affect the safe use of the system.
- The nonconducting materials of this device may be susceptible to ignition-capable level of electrostatic charging and precautions must be taken to avoid this. The user/installer shall ensure that the equipment is not installed in a location where it may be subjected to external conditions (such as high-pressure steam) which are conducive to creating a build-up of electrostatic charges.

## Install the HLS28

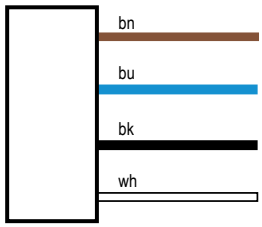
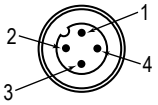
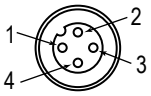
1. Remove power at the DC power supply.
2. Remove the light from the packaging and inspect it for damage before installing it.
3. Attach the included SMBWLS28RA brackets, or other compatible brackets, to the light.
   Refer to "Accessories" on page 11 for a complete list of compatible brackets.
4. Select a suitable mounting location inside the appropriately rated enclosure for the application as described above.

> **IMPORTANT:** Do not mount these luminaires near heat generating sources (for example, devices) that will increase the surrounding temperatures within the enclosure greater than the ambient temperature ratings (see Operating Temperature in "Specifications" on page 4 for further details).

5. Place the light in the mounting location and mark the positions of the bracket mounting holes.
6. Use appropriate fasteners (screws) to secure the bracket to the mounting location.
7. Wire the leads of the cables per the wiring diagram onto the light. Terminate wire as appropriate per application. On QD models, secure the cordset M12 × 1 QD retaining nut to the HLS28 mating QD; do not over-tighten.
8. Installation is complete. Reapply power at the DC power supply.

**WARNING:**
- **Explosion Hazard**
- Do not disconnect equipment unless the power has been switched off or the area is known to be non-hazardous.

## Wiring

| Diagram | Wire | Single Color Models | Multicolor Models | Pinout (Male) | Pinout (Female) |
|---|---|---|---|---|---|
|  | 1 - Brown | 12 V DC to 30 V DC | Input 1 |  1 = Brown<br>2 = White<br>3 = Blue<br>4 = Black |  1 = Brown<br>2 = White<br>3 = Blue<br>4 = Black |
| | 2 - White | Not used | Input 3 | | |
| | 3 - Blue | DC common | DC Common | | |
| | 4 - Black | Connect to 12 V DC to 30 V DC for 50% maximum intensity. For maximum intensity, leave the black wire floating or connected to common. | Input 2 | | |

| 3 Color Override Control *(Color 3 overrides Colors 1 and 2, Color 2 overrides Color 1)* | | | |
|---|---|---|---|
| **Input 1: Pin 1 Brown Wire** | **Input 2: Pin 4 Black Wire** | **Input 3: Pin 2 White Wire** | **LED Color** |
| — | — | — | Light OFF |
| +24 V DC | — | — | Color 1 ON |
| — | +24 V DC | — | Color 2 ON |
| +24 V DC | +24 V DC | — | Color 2 ON |
| — | — | +24 V DC | Color 3 ON |
| +24 V DC | — | +24 V DC | Color 3 ON |
| — | +24 V DC | +24 V DC | Color 3 ON |
| +24 V DC | +24 V DC | +24 V DC | Color 3 ON |

| 5 Color Binary Control *(Binary input state controls color)* | | | |
|---|---|---|---|
| **Input 1: Pin 1 Brown Wire** | **Input 2: Pin 4 Black Wire** | **Input 3: Pin 2 White Wire** | **LED Color** |
| — | — | — | Light OFF |
| +24 V DC | — | — | Color 1 ON |

Continued on page 4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Continued from page 3

| 5 Color Binary Control *(Binary input state controls color)* | | | |
|---|---|---|---|
| **Input 1: Pin 1 Brown Wire** | **Input 2: Pin 4 Black Wire** | **Input 3: Pin 2 White Wire** | **LED Color** |
| — | +24 V DC | — | Color 2 ON |
| — | — | +24 V DC | Color 3 ON |
| +24 V DC | +24 V DC | — | Color 4 ON |
| +24 V DC | — | +24 V DC | Color 5 ON |
| — | +24 V DC | +24 V DC | Light OFF |
| +24 V DC | +24 V DC | +24 V DC | Light OFF |

# Specifications

## HLS28 Single Color Specifications

**Supply Voltage and Current**

12 V DC to 30 V DC (See Table 1)

Use only with suitable Class 2 power supply (UL) or a SELV power supply (CE).

See electrical characteristics on product label

**Supply Protection Circuitry**

Protected against reverse polarity and transient voltages

**Light Characteristics**

Cool white

Color Temperature (CCT): 6500K (+500K, -400K)
Lumen output: 800 (± 5%) per foot, typical at 25 °C (77 °F)
Luminous efficacy: 110 lumens/Watt typical at 24 V dc at 25 °C (77 °F)
CRI: 85, typical

**Leakage Current Immunity**

400 µA

**LED Lifetime**

Lumen Maintenance = $L_{70}$

When operating within specifications, output will decrease less than 30% after 75,000 hours.

**Vibration and Mechanical Shock**

Vibration 10-55 Hz 1.0 mm p-p amplitude per IEC 60068-2-6

Shock 15G 11 ms duration, half sine wave per IEC 60068-2-27

**Operating Temperature**

Models without motion detection:–40 °C to +70 °C (–40 °F to +158 °F)

Models with motion detection: –20 °C to +60 °C (–4 °F to +140 °F)

Light output begins to decrease above 50 °C (122 °F) and will be approximately 65% of max intensity at 60 °C (140 °F) and 30% of max intensity at 70 °C (158 °F)

**Storage Temperature**

–40 °C to +70 °C (–40 °F to +158 °F)

**Application Note**

When connecting cascadable lights in series at 100% intensity, it is important not to exceed maximum current limitations:

Maximum length of light at 12 V DC: 1.4 m (4.6 ft)
Maximum length of light at 24 V DC: 3.0 m (9.8 ft)
Maximum length of light at 30 V DC: 3.1 m (10.2 ft)

At 50% intensity, double the lengths.

Do not spray cable with high-pressure sprayer, or cable damage will result.

**Models with Motion Detection**

Light turns off after approximately 60 seconds without detecting motion

Range: 12 meters; ± 45° field of view

Standby current: 170 µA

**Construction**

Clear anodized aluminum housing; painted zinc end caps; polycarbonate window on clear and diffuse plastic models; zinc plated steel brackets

**Mounting**

Two swivel brackets SMBWLS28RA included and four screws

**Connections**

Integral 4-pin M12 male quick-disconnect connector (4-pin connecting QD cordset required); or 2 m (6.5 ft) integral PVC-jacketed cable

Connecting 4-pin M12 QD Cordsets (see Cordsets):

Female single-ended or male/female double-ended;
Multiconductor cable (at minimum): UL AVLV2 Style 2517, 24 AWG wire, rated ≥ 80 °C;
M12 QD connector: per IEC 61076-2-101, must have threaded M12 × 1 retaining nut.

**Environmental Rating**

IP50

**Required Overcurrent Protection**

**WARNING:** Electrical connections must be made by qualified personnel in accordance with local and national electrical codes and regulations.

Overcurrent protection is required to be provided by end product application per the supplied table.

Overcurrent protection may be provided with external fusing or via Current Limiting, Class 2 Power Supply.

Supply wiring leads < 24 AWG shall not be spliced.

For additional product support, go to www.bannerengineering.com.

| Supply Wiring (AWG) | Required Overcurrent Protection (A) | Supply Wiring (AWG) | Required Overcurrent Protection (A) |
|---|---|---|---|
| 20 | 5.0 | 26 | 1.0 |
| 22 | 3.0 | 28 | 0.8 |
| 24 | 2.0 | 30 | 0.5 |


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### Typical Current

| Light Length | Typical Current | | | Max. Current | Lumens [2] (Typical @25 °C) |
|---|---|---|---|---|---|
| | 12 V DC | 24 V DC | 30 V DC | A | Cool White |
| 145 mm | 0.33 A | 0.15 A | 0.12 A | 0.4 | 400 |
| 285 mm | 0.66 A | 0.30 A | 0.24 A | 0.8 | 800 |
| 430 mm | 1.01 A | 0.46 A | 0.36 A | 1.2 | 1200 |
| 570 mm | 1.36 A | 0.61 A | 0.48 A | 1.6 | 1600 |
| 710 mm | 1.75 A | 0.77 A | 0.60 A | 2.0 | 2000 |
| 850 mm | 2.13 A | 0.92 A | 0.73 A | 2.4 | 2400 |
| 990 mm | 2.59 A | 1.08 A | 0.85 A | 2.8 | 2800 |
| 1130 mm | 3.04 A | 1.24 A | 0.97 A | 3.2 | 3200 |

[2] Lumen values lowered by 25% on diffused window and 25 degree lensed models.

## HLS28 Multicolor Specifications

### Supply Voltage and Current

24 V DC (+ 20% / - 10%)

Use only with suitable Class 2 power supply (UL) or a SELV power supply (CE)

See electrical characteristics on product label

| Lighted Length | Typical Current (A) at 25° C | Maximum Current (A) |
|---|---|---|
| 285 mm | 0.315 | 0.400 |
| 570 mm | 0.630 | 0.800 |
| 850 mm | 0.945 | 1.200 |
| 1130 mm | 1.260 | 1.600 |

Typical Current values are shown at 25 °C - current and lumen values decrease 0.4% per 1 °C from ambient. For example, a 1130 mm unit will have a maximum current of 1.600 A at -40 °C and 1.134 A at +50 °C.

### Supply Protection Circuitry

Protected against reverse polarity and transient voltages

### Approvals

NEC and CEC:

Models without motion detection option: –40°C ≤ $T_a$ ≤ +70°C
Models with motion detection option: –20°C ≤ $T_a$ ≤ +60°C
Class I Zone 2 IIC T4 / Class I Div 2 Groups ABCD T4

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ATEX/UKCA/IECEX:

Models without motion detection option: –40°C ≤ $T_a$ ≤ +70°C
Models with motion detection option: –20°C ≤ $T_a$ ≤ +60°C
Ex II 3 G Ex ec IIC T4 Gc (Group IIC Zone 2)

UL 21 ATEX 2508X
IECEx UL 21.0007X

IEC 60079-0:2017
IEC 60079-7:2017

CE Banner Engineering BV
Park Lane, Culliganlaan 2F bus 3
1831 Diegem, BELGIUM

UKCA Turck Banner LTD Blenheim House
Blenheim Court
Wickford, Essex SS11 8YT
GREAT BRITAIN

### Light Characteristics

Daylight White Efficacy: 85 lumens/watt typical at 24 V DC at 25 °C (77 °F)

CRI: 80, minimum

| Color | Dominant Wavelength (nm) or Color Temperature | Lighted Length Lumens (Typical at 25 °C) | | | |
|---|---|---|---|---|---|
| | | 285 mm | 570 mm | 850 mm | 1130 mm |
| Green | 525 nm | 400 | 800 | 1200 | 1600 |
| Red | 625 nm | 185 | 370 | 555 | 740 |
| Yellow | 580 nm | 570 | 1140 | 1710 | 2280 |
| Blue | 470 nm | 125 | 250 | 375 | 500 |
| Daylight White | 5000 K (±300 K) | 650 | 1300 | 1950 | 2600 |

Lighted Lengh Lumens values are shown at 25 °C - current and lumen values decrease 0.4% per 1 °C from ambient. For example, a 1130 mm unit will have a maximum current of 1.600 A at -40 °C and 1.134 A at +50 °C.

### Connections

Integral 4-pin M12 male quick-disconnect connector (4-pin connecting QD cordset required); or 2 m (6.5 ft) integral PVC-jacketed cable

Connecting 4-pin M12 QD Cordsets (see Cordsets):

Female single-ended or male/female double-ended; Multiconductor cable (at minimum): UL AVLV2 Style 2517, 24 AWG wire, rated ≥ 80 °C;
M12 QD connector: per IEC 61076-2-101, must have threaded M12 × 1 retaining nut.


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### Construction

Clear anodized aluminum housing; painted zinc end caps; polycarbonate window on clear and diffuse plastic models; zinc plated steel brackets

### Environmental Rating

IP50

### Vibration and Mechanical Shock

Vibration: 10 Hz to 55 Hz, 1.0 mm peak-to-peak amplitude per IEC 60068-2-6

Shock: 15G 11 ms duration, half sine wave per IEC 60068-2-27

### Operating Temperature

–40 °C to +50 °C (–40 °F to +122 °F)

### Storage Temperature

–40 °C to +50 °C (–40 °F to +122 °F)

### Application Notes

When connecting cascadable lights in series it is important not to exceed maximum current limitations:

Maximum length of light at 24 V DC: 3.0 m (9.8 ft)

Do not spray cable with high-pressure sprayer, or cable damage will result

### Leakage Current Immunity

400 µA

### LED Lifetime

Lumen Maintenance - $L_{70}$

When operating within specifications, output decreases less than 30% after 50,000 hours

### Mounting

Two SMBWLS28RA swivel brackets and four screws included

### Approvals

NEC and CEC:

Models without motion detection option: –40°C ≤ $T_a$ ≤ +50°C

Class I Zone 2 IIC T4 / Class I Div 2 Groups ABCD T4

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ATEX/UKCA/IECEX:

Models without motion detection option: –40°C ≤ $T_a$ ≤ +50°C

Ex II 3 G Ex ec IIC T4 Gc (Group IIC Zone 2)

UL 21 ATEX 2508X
IECEx UL 21.0007X

IEC 60079-0:2017
IEC 60079-7:2017

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Wickford, Essex SS11 8YT
GREAT BRITAIN

### Required Overcurrent Protection

**WARNING:** Electrical connections must be made by qualified personnel in accordance with local and national electrical codes and regulations.

Overcurrent protection is required to be provided by end product application per the supplied table.

Overcurrent protection may be provided with external fusing or via Current Limiting, Class 2 Power Supply.

Supply wiring leads < 24 AWG shall not be spliced.

For additional product support, go to www.bannerengineering.com.

| Supply Wiring (AWG) | Required Overcurrent Protection (A) | Supply Wiring (AWG) | Required Overcurrent Protection (A) |
|---|---|---|---|
| 20 | 5.0 | 26 | 1.0 |
| 22 | 3.0 | 28 | 0.8 |
| 24 | 2.0 | 30 | 0.5 |

## FCC Part 15 Class B for Unintentional Radiators

(Part 15.105(b)) This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

(Part 15.21) Any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate this equipment.


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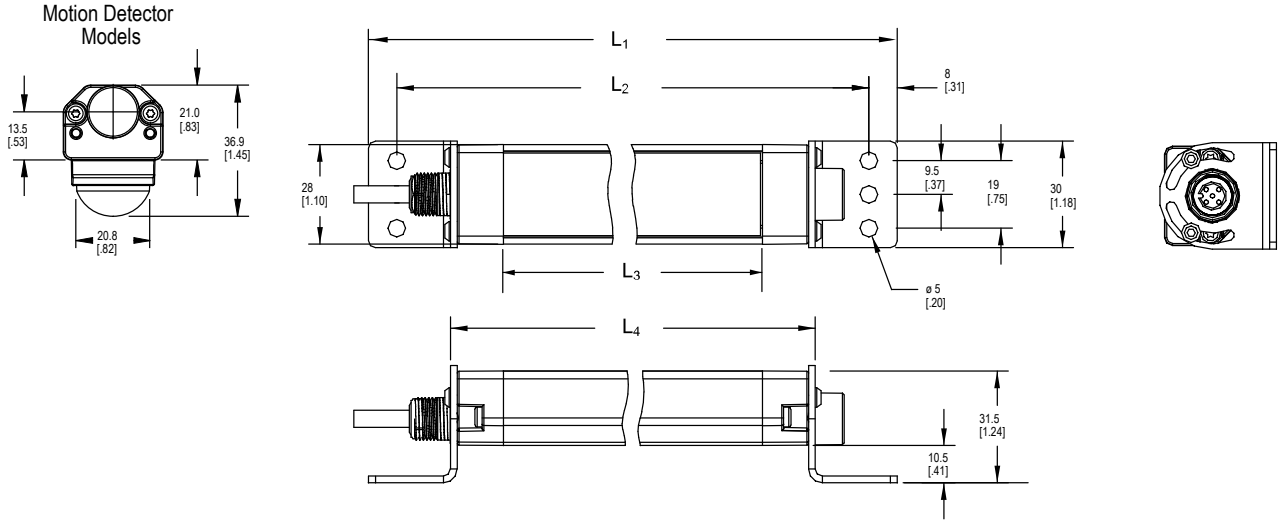
# Industry Canada ICES-003(B)

This device complies with CAN ICES-3 (B)/NMB-3(B). Operation is subject to the following two conditions: 1) This device may not cause harmful interference; and 2) This device must accept any interference received, including interference that may cause undesired operation.

Cet appareil est conforme à la norme NMB-3(B). Le fonctionnement est soumis aux deux conditions suivantes : (1) ce dispositif ne peut pas occasionner d'interférences, et (2) il doit tolérer toute interférence, y compris celles susceptibles de provoquer un fonctionnement non souhaité du dispositif.

# Dimensions

All measurements are listed in millimeters [inches], unless noted otherwise. The measurements provided are subject to change.




Dimensions are shown with the included SMBWLS28RA bracket.

| Models without motion detection | | | | |
|---|---|---|---|---|
| **Model** | **$L_1$** | **$L_2$** | **$L_3$** | **$L_4$** |
| HLS28..145X | 221 mm (8.7 in) | 205 mm (8.1 in) | 145 mm (5.71 in) | 175 mm (6.9 in) |
| HLS28..285X | 362 mm (14.3 in) | 346 mm (13.6 in) | 286 mm (11.26 in) | 316 mm (12.4 in) |
| HLS28..430X | 503 mm (19.8 in) | 487 mm (19.2 in) | 427 mm (16.81 in) | 457 mm (18.0 in) |
| HLS28..570X | 644 mm (25.4 in) | 628 mm (24.7 in) | 568 mm (22.36 in) | 598 mm (23.5 in) |
| HLS28..710X | 785 mm (30.9 in) | 769 mm (30.3 in) | 709 mm (27.91 in) | 739 mm (29.1 in) |
| HLS28..850X | 926 mm (36.5 in) | 910 mm (35.8 in) | 850 mm (33.46 in) | 880 mm (34.6 in) |
| HLS28..990X | 1067 mm (42 in) | 1051 mm (41.4 in) | 991 mm (39.02 in) | 1021 mm (40.2 in) |
| HLS28..1130X | 1208 mm (47.6 in) | 1192 mm (46.9 in) | 1132 mm (44.57 in) | 1162 mm (45.7 in) |

| Models with motion detection | | | | |
|---|---|---|---|---|
| **Model** | **$L_1$** | **$L_2$** | **$L_3$** | **$L_4$** |
| HLS28..145XM | 251 mm (9.9 in) | 235 mm (9.3 in) | 145 mm (5.71 in) | 205 mm (8.1 in) |
| HLS28..285XM | 392 mm (15.4 in) | 376 mm (14.8 in) | 286 mm (11.26 in) | 346 mm (13.6 in) |
| HLS28..430XM | 533 mm (21.0 in) | 517 mm (20.4 in) | 427 mm (16.81 in) | 487 mm (19.2 in) |
| HLS28..570XM | 674 mm (26.5 in) | 658 mm (25.9 in) | 568 mm (22.36 in) | 628 mm (24.7 in) |
| HLS28..710XM | 815 mm (32.1 in) | 799 mm (31.5 in) | 709 mm (27.91 in) | 769 mm (30.3 in) |
| HLS28..850XM | 956 mm (37.6 in) | 940 mm (37 in) | 850 mm (33.46 in) | 910 mm (35.8 in) |
| HLS28..990XM | 1097 mm (43.2 in) | 1081 mm (42.6 in) | 991 mm (39.02 in) | 1051 mm (41.4 in) |
| HLS28..1130XM | 1238 mm (48.7 in) | 1222 mm (48.1 in) | 1132 mm (44.57 in) | 1192 mm (46.9 in) |

# Performance

The optical data shown below is for standard single color, cool white only. To calculate lux and candela values for colors in the multicolor models, multiply the values shown on the charts by the following factors.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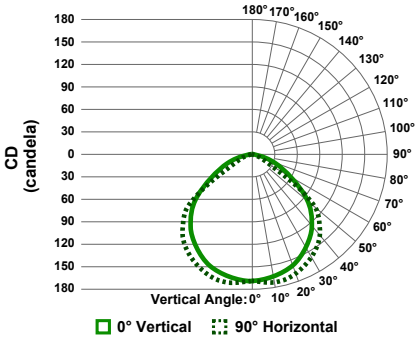
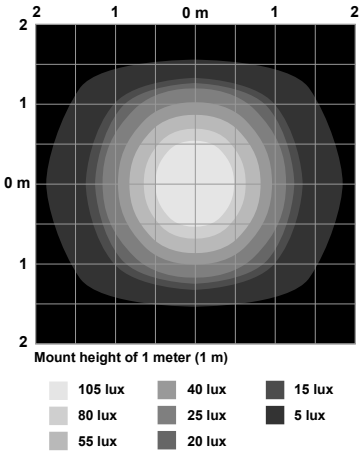
| Color for Multicolor Models | Multiplier |
|---|---|
| Daylight white | 0.813 |
| Green | 0.500 |
| Red | 0.231 |
| Yellow | 0.713 |
| Blue | 0.156 |

*145 mm Models*

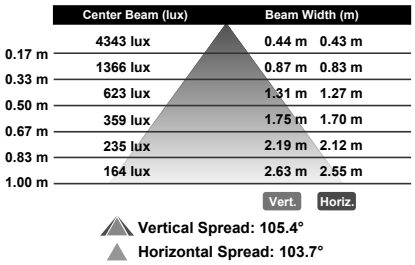
**Polar Candela Distribution**




**Isolux Pattern**

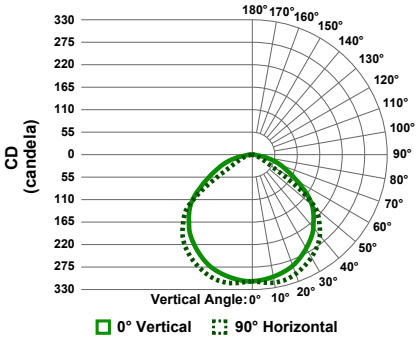



**Illuminance at a Distance**

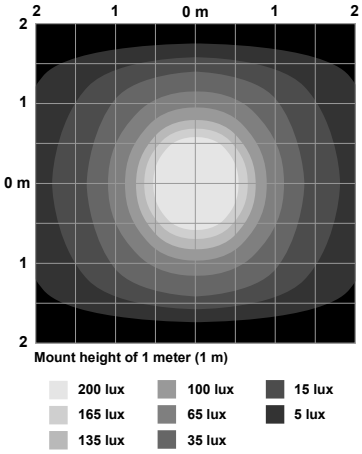



*285 mm Models*

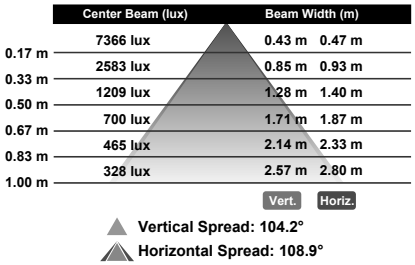
**Polar Candela Distribution**




**Isolux Pattern**




**Illuminance at a Distance**





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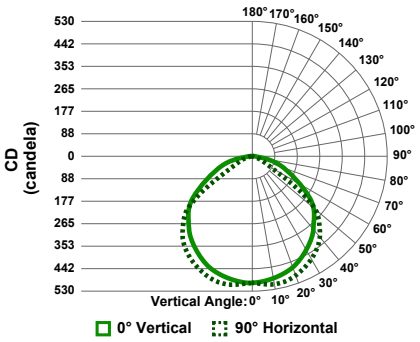
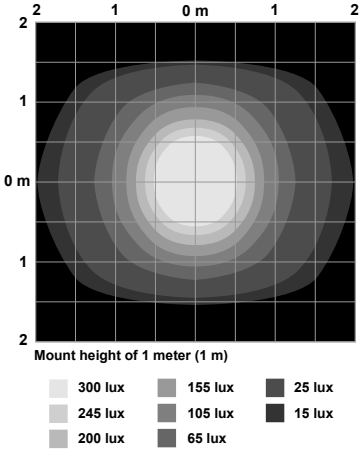
*430 mm Models*

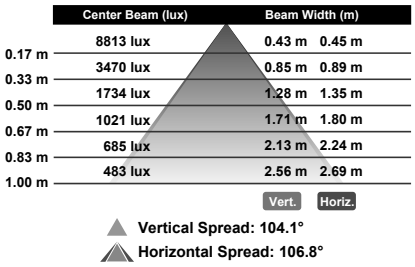
### Polar Candela Distribution




### Isolux Pattern

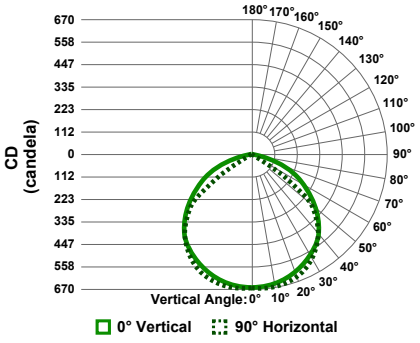



### Illuminance at a Distance

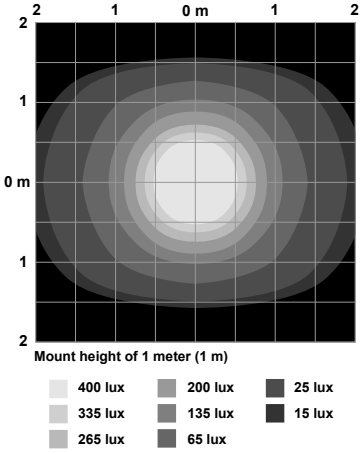



*570 mm Models*

### Polar Candela Distribution




### Isolux Pattern

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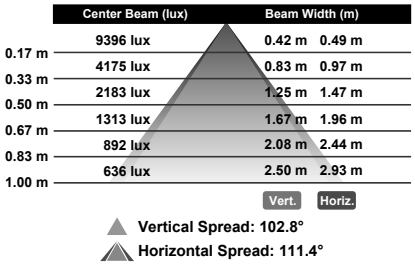
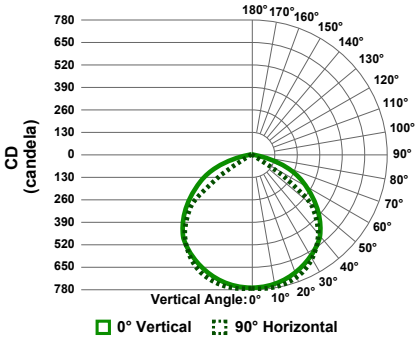



*710 mm Models*

### Polar Candela Distribution

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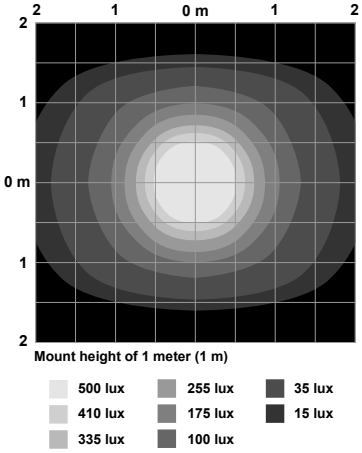
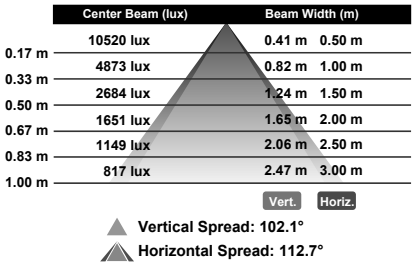



### Illuminance at a Distance





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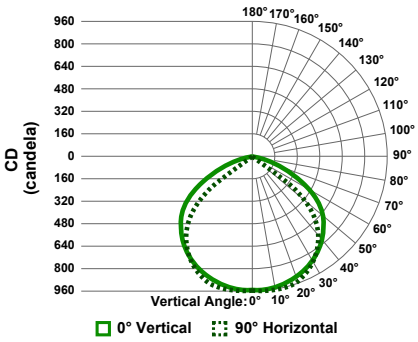
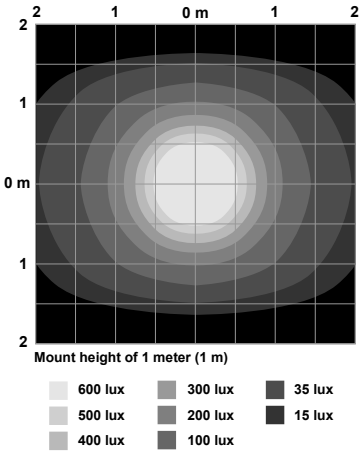
*850 mm Models*

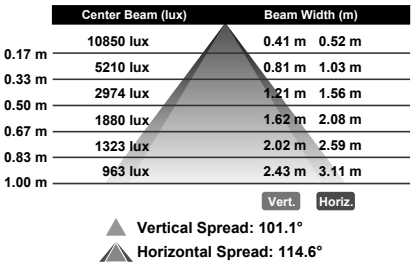
### Polar Candela Distribution




### Isolux Pattern

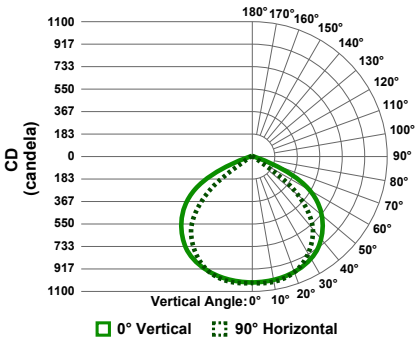



### Illuminance at a Distance

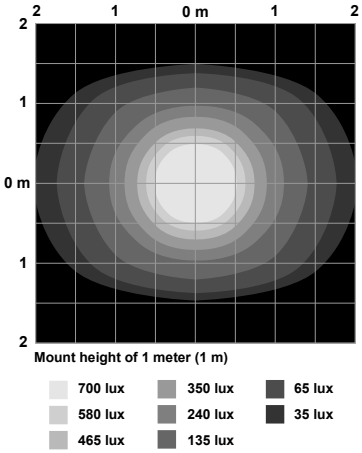



*990 mm Models*

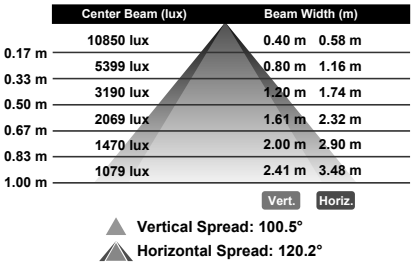
### Polar Candela Distribution




### Isolux Pattern

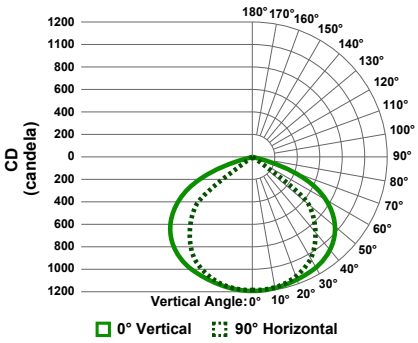



### Illuminance at a Distance

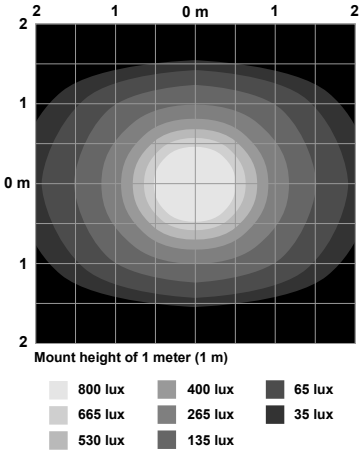



*1130 mm Models*

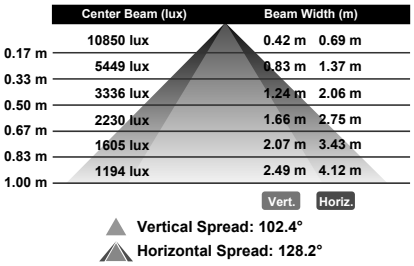
### Polar Candela Distribution




### Isolux Pattern




### Illuminance at a Distance





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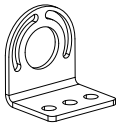
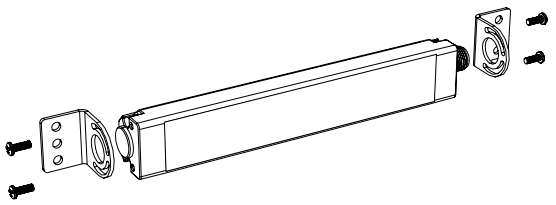
# Accessories

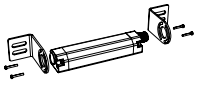
## Brackets

**SMBWLS28RA**
- Replacement end bracket kit
- 1.8 mm (14 gage) cold rolled steel with zinc plate, clear chromate finish
- Kit contains two end brackets and four screws

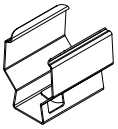


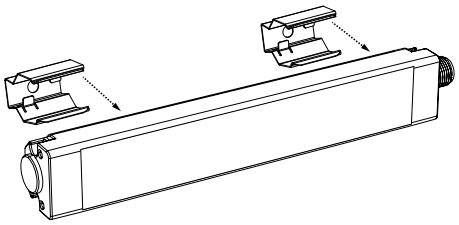


**SMBWLS28SM**
- End bracket kit
- Cold Rolled Steel with a clear zinc finish
- Allows the light or switch to be mounted at a right angle to the mounting surface
- Kit contains two end brackets and four screws



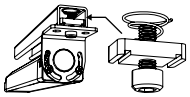
**SMBWLS28SP**
- Stainless steel snap bracket kit
- Includes two brackets



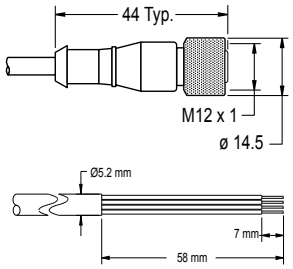
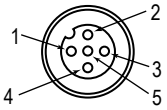


**SMH1316**
This kit allows the light or switch to be mounted to a 13/16-inch Unistrut channel. Light is shown. The kit includes:

- #10-32 spring nuts (qty 2)
- #10-32 socket head cap screws (qty 2)
- #10 lock washers (qty 2)



## Cordsets

| 4-Pin Single-Ended M12 Female Cordsets | | | | | |
|---|---|---|---|---|---|
| **Model** | **Length** | **Style** | **Dimensions** | **Pinout (Female)** | |
| **MQDC-406** | 2 m (6.56 ft) | Straight |   |   | 1 = Brown<br>2 = White<br>3 = Blue<br>4 = Black<br>5 = Not used |
| **MQDC-415** | 5 m (16.4 ft) | | | | |
| **MQDC-430** | 9 m (29.5 ft) | | | | |
| **MQDC-450** | 15 m (49.2 ft) | | | | |

Continued on page 12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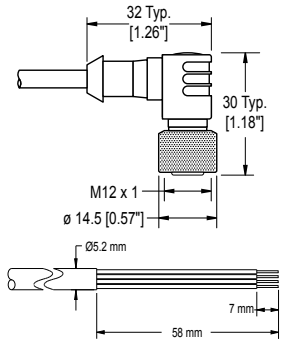
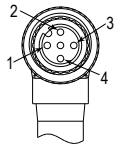
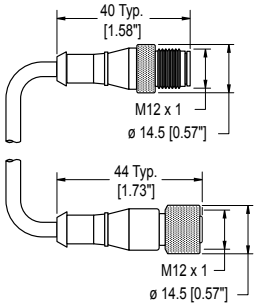
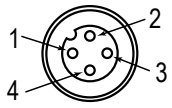
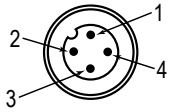
Continued from page 11

| 4-Pin Single-Ended M12 Female Cordsets | | | | | |
|---|---|---|---|---|---|
| **Model** | **Length** | **Style** | **Dimensions** | **Pinout (Female)** | |
| **MQDC-406RA** | 2 m (6.56 ft) | Right-Angle |  |  | |
| **MQDC-415RA** | 5 m (16.4 ft) | | | | |
| **MQDC-430RA** | 9 m (29.5 ft) | | | | |
| **MQDC-450RA** | 15 m (49.2 ft) | | | | |

| 4-Pin Double-Ended M12 Female to M12 Male Cordsets | | | | |
|---|---|---|---|---|
| **Model** | **Length** | **Style** | **Dimensions** | **Pinout** |
| **MQDEC-401SS** | 0.31 m (1 ft) | Male Straight/Female Straight |  | Female<br><br>Male<br><br>1 = Brown<br>2 = White<br>3 = Blue<br>4 = Black |
| **MQDEC-403SS** | 0.91 m (2.99 ft) | | | |
| **MQDEC-406SS** | 1.83 m (6 ft) | | | |
| **MQDEC-412SS** | 3.66 m (12 ft) | | | |
| **MQDEC-415SS** | 4.58 m (15 ft) | | | |
| **MQDEC-420SS** | 6.10 m (20 ft) | | | |
| **MQDEC-430SS** | 9.14 m (30.2 ft) | | | |
| **MQDEC-450SS** | 15.2 m (49.9 ft) | | | |

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